

BEFORE THE PUBLIC SERVICE COMMISSION
OF THE STATE OF MISSOURI

In the Matter of Union Electric Company d/b/a)
Ameren Missouri’s Tariff to Increase its)
Revenues for Electric Service) Case No. ER-2014-0258

SIERRA CLUB POST-HEARING REPLY BRIEF

Table of Contents

I. Introduction..... 1

II. Sierra Club provided evidence creating a serious doubt as to the ESP retrofits’ prudence and the potential harm to ratepayers. 2

III. Ameren assertions about the future cost of operating Labadie are unsupported by Exhibit 65HC 7

IV. Conclusion 8

I. Introduction

Sierra Club’s testimony in this case demonstrates that Ameren Missouri (“Ameren” or the “Company”) has not met its burden of proving the prudence of capital expenditures associated with the installation of electrostatic precipitators (“ESPs”) on Labadie Units 1 and 2. Although Ameren had initially enjoyed a presumption of prudence regarding its ESP expenditures, Sierra Club’s testimony created a serious doubt as to their prudence, thereby shifting the burden to Ameren to prove that the retrofits were prudent. Ameren subsequently failed to submit relevant evidence necessary to meet its burden. In its *Initial Post-Hearing Brief*, Ameren attempts to gloss over these deficiencies in the record by barely mentioning Sierra Club’s testimony and, instead, focusing on outdated and misleading cost assumptions for Labadie. The Company has yet to respond to two primary deficiencies identified by Sierra Club. First, Ameren utterly failed to

conduct a net present value analysis comparing the specific ESP retrofits at Labadie Units 1 and 2 against other reasonable regulatory compliance options at those same units. Second, Ameren presented its 2014 Integrated Resource Plan (“IRP”) as supporting the Labadie ESP retrofits, yet the 2014 IRP is predicated upon unreasonable and/or undocumented environmental regulatory risk assumptions.

II. Sierra Club provided evidence creating a serious doubt as to the ESP retrofits’ prudence and the potential harm to ratepayers.

Under Missouri law, Ameren enjoys a presumption that its capital expenditures on the Labadie ESPs are prudent.¹ However, when a party raises a serious doubt about the prudence of a utility expenditure, the presumption disappears and the burden shifts to the utility to justify the expenditure.² Contrary to Ameren’s argument that Sierra Club has offered only “weak and speculative” evidence on this issue,³ Sierra Club witness Dr. Ezra Hausman described two concrete factors establishing a serious doubt about the prudence of the Labadie ESP retrofits.

First, Dr. Hausman discussed the absence of any Ameren analysis whatsoever determining whether avoiding the retrofit costs at Labadie through curtailed or suspended operations, expanded demand-side resources, or other avenues would be the least-cost option for the Company’s ratepayers.⁴ Rather, the Company superficially suggested that the retrofits were the only available option to comply with the Environmental Protection Agency’s (“EPA”) Mercury and Air Toxics Standards (“MATS”).⁵ On its face, this justification is inadequate since

¹ *Associated Natural Gas Co. v. Pub. Serv. Comm’n of State of Mo.*, 954 S.W.2d 520, 529-530 (Mo.App. W.D. 1997).

² *Office of Pub. Counsel v. Missouri Pub. Serv. Comm’n*, 409 S.W.3d 371, 376 (Mo. 2013).

³ Ameren *Initial Post-Hearing Brief*, p. 108.

⁴ Exhibit 900, Direct Testimony of Ezra Hausman, p. 10, ll. 1-7.

⁵ Exhibit 28, Direct Testimony of Michael Moehn, p. 12, ll. 17-19. *See also* Tr. p. 1924, ll. 18-25.

installing ESPs on the units is merely one option among many available to Ameren to comply with MATS.⁶ In attempting to rebut this claim, Ameren did not provide the missing analysis, but instead the Company pointed to its 2014 IRP, which found that retiring all four units at Labadie in the year 2023 would not be in ratepayers' best interests.⁷ However, this is a straw man argument erected by the Company to distract from the salient point—the Company conducted no analysis of whether an alternative approach tailored to Labadie Units 1 and 2, and specific to the 2016 MATS compliance deadline for those units, would have presented a lower-cost compliance alternative than investing in new ESPs at Labadie Units 1 and 2.⁸ The Commission's role regarding the ESP retrofits is to determine whether Ameren's "conduct was reasonable at the time, under all of the circumstances."⁹ Without a net present value analysis based on an "apples to apples" comparison of the proposed investment with available alternatives, there is no way for Ameren and the other parties to evaluate, and for the Commission to determine, whether the Company's expenditures on the ESPs were reasonable and should be included in the Company's rate base.

Second, Dr. Hausman testified that Ameren clings to the unreasonable and unsupported position that there is an 85% chance of no carbon costs affecting the future operation of Labadie.¹⁰ At the same time, Ameren assumes that other utilities will retire their coal-fired power

⁶ See Exhibit 900, Direct Testimony of Ezra Hausman, p. 10, ll. 1-7.

⁷ Exhibit 26, Amended Rebuttal Testimony of Matt Michels, p. 16, ll. 3-20.

⁸ See Exhibit 900, Direct Testimony of Ezra Hausman, p. 10, ll. 1-7.

⁹ See *State ex rel. GS Technologies Operating Co., Inc. v. Pub. Serv. Comm'n of State of Mo.*, 116 S.W.3d 680, 694 (Mo.App. W.D. 2003).

¹⁰ Exhibit 900, Direct Testimony of Ezra Hausman, p. 8, l. 3.

plants in response to carbon regulations.¹¹ That is, Ameren's assumptions lead to the strange and unsupported result in its IRP modeling of an 85% probability that Labadie actually *benefits* from greenhouse gas regulations by continuing to operate unaffected while other utilities' power plants bear the costs.¹² Moreover, Ameren freely acknowledges that these assumptions are the Company's own subjective opinion, rather than product of a quantitative process.¹³ Ameren also acknowledges that the preferred resource plan modeled in its IRP is not compliant with EPA's Clean Power Plan as proposed.¹⁴

In its *Initial Post-Hearing Brief*, Ameren skirts significant issues surrounding greenhouse gas regulation and now posits that, because the Clean Power Plan is not yet final, "it would be impossible to consider their impact on Labadie...."¹⁵ Such an analysis is not only possible, but utilities across the country do it routinely. Ameren must be acutely aware of this possibility, as the Company testified that it relied upon a Synapse Energy Economics report to develop the Company's carbon dioxide price forecasts.¹⁶ First, as the report's Executive Summary plainly states, "an assumption that there will be no CO₂ price in the long run is not, in our view, reasonable."¹⁷ Then, Figure 2 of the report graphically depicts the CO₂ prices utilized by twenty-six different utilities in their IRPs over 2012 and 2013 alone, with only one utility utilizing a \$0

¹¹ Tr. p. 1938, ll. 8-12.

¹² Tr. p. 1938, ll. 13-25, p. 1939, ll. 1-2.

¹³ Tr. p. 1940, ll. 4-9.

¹⁴ See Case No. EO-2015-0084, Dkt. No. 1, Ameren 2014 IRP, Chapter 10, p.18 (explaining Figure 10.4 by stating that "Ameren is advocating for changes to the EPA's proposed rules that will allow Ameren ... to execute its Preferred Resource Plan ... over a slightly longer period of time.").

¹⁵ Ameren *Initial Post-Hearing Brief*, p. 106.

¹⁶ Exhibit 26, Amended Rebuttal Testimony of Matt Michels, p. 10, ll. 8-12.

¹⁷ Exhibit 900, Direct Testimony of Ezra Hausman, Schedule EDH-2, p. 1.

carbon cost.¹⁸ In compiling this figure, Synapse simply used publicly available numbers from utilities across the country, without alteration.¹⁹ Yet, despite the thorough and straightforward information presented in the Synapse report, the Company's greenhouse gas assumptions are fundamentally inconsistent with that report's finding that it would not be reasonable for a utility to assume a future carbon price of zero. Indeed, Ameren's mishandling of the price trajectories referenced in the report led one of the report's authors to decry the Company's "gross misapplication" of the analysis.²⁰ It is irrational for the Company to presume that Labadie will operate for decades into the future unaffected by a regulation that specifically targets carbon dioxide emissions from coal-fired power plants. Ameren's assertion that it has appropriately accounted for greenhouse gas regulation²¹ is simply not reasonable and not supported by the record before the Commission.²² To the contrary, the Synapse report on which Ameren purports to rely directly contradicts the Company's assumptions.

Ameren's unsupported greenhouse gas assumptions are not the only environmental regulatory risk assumptions that Ameren inadequately documents in its 2014 IRP. For instance, Ameren predicts that Flue Gas Desulfurization systems ("scrubbers") would be required at just two units at Labadie.²³ This is an unexplained and drastic shift from the Company's 2011 IRP, where Ameren assumed that scrubbers would be required at all six Labadie and Rush Island units

¹⁸ Exhibit 900, Direct Testimony of Ezra Hausman, Schedule EDH-2, p. 16-17.

¹⁹ *Id.*

²⁰ See Sierra Club *Initial Post-Hearing Brief*, p. 10, footnote 44.

²¹ See Exhibit 26, Amended Rebuttal Testimony of Matt Michels, p. 4, ll. 18-19.

²² See *State ex rel. GS Technologies Operating Co., Inc. v. Pub. Serv. Comm'n of State of Mo.*, 116 S.W.3d 680, 694 (Mo.App. W.D. 2003) (noting that the prudence standard guides the Commission to determine whether a utility's conduct "was reasonable at the time, under all of the circumstances.").

²³ See Case No. EO-2015-0084, Dkt. No. 45, Comments on Ameren Missouri's 2014 Integrated Resource Plan (IRP) by Ezra D. Hausman, pp. 9-10.

under both “moderate” and “aggressive” environmental scenarios.²⁴ Relatedly, Ameren assumes that Sioux will require a Selective Catalytic Converter system in 2020, yet provides no explanation why that same technology would not be required at Labadie and Rush Island.²⁵ Nor does the Company include in its 2014 IRP a unit-by-unit analysis evaluating whether retrofits, retirements, or other compliance options could be staggered across the Company’s fleet in order to comply with regulatory requirements.²⁶ Instead, the Company unreasonably assumes—again without explanation—that all units at a particular power plant can only retire on the same or a similar timeline.²⁷ On its face, this all-or-nothing assumption is silly, as repowering or retiring one unit at one or two power plants would be much less disruptive to the Company’s system than retiring gigawatts of capacity all at once.

Although the sufficiency of Ameren’s IRP under the Commission’s rules is not being litigated in this case, Ameren put the IRP’s assumptions at issue in this case by pointing to the IRP as the sole evidence in the record that the Company’s investment in ESPs at Labadie Units 1 and 2 was a prudent one.²⁸ Taken individually or together, Ameren’s multiple unreasonable and/or unsupported assumptions in its IRP regarding regulatory risk biases its analyses towards costly capital expenditures,²⁹ undermining any evidentiary value it would have in this case.

²⁴ *Id.* at 10.

²⁵ *Id.* at 10.

²⁶ *See id.* at 10.

²⁷ *Id.*

²⁸ *See, e.g.*, Exhibit 26, Amended Rebuttal Testimony of Matt Michels, p. 11, ll. 11-17.

²⁹ *See, e.g.*, Exhibit 901, Surrebuttal Testimony of Ezra Hausman, p. 6, ll. 3-11.

III. Ameren assertions about the future cost of operating Labadie are unsupported by Exhibit 65HC

Ameren has not presented any analyses that document and describe reasonably foreseeable regulatory compliance costs on its generation fleet. Rather than tackle the deficiencies head on, the Company instead attempts to confuse the issues by referencing Exhibit 65HC in an attempt to portray Labadie as one of the cheapest coal plants to operate in the country.³⁰ This exhibit compares Labadie's past operating costs against those of other coal-fired power plants, but it provides no information as to how many of those other plants already have ESPs, scrubbers, SCRs, or other pollution controls—controls that Labadie has either only recently installed (such as the ESPs) or will be required to install in the near future (such as scrubbers). Indeed, the cost figures for Labadie reflected in Exhibit 65HC do not even incorporate the costs of operating the ESPs at issue in this proceeding. Even Ameren acknowledges that if Labadie is to continue operating into the future, additional pollution control investments will be needed³¹ that will, in turn, drive up the plant's production costs. Ameren assumes that Labadie will continue to be among the nation's cheapest coal plants,³² yet the Company offers no evidence to support its contention. Because Ameren has not provided the Commission with any information to evaluate whether Labadie's current operating costs are indicative of its future costs, the Commission should disregard Exhibit 65HC.

³⁰ Tr. p. 1952, ll. 16-24.

³¹ *See generally* Case No. EO-2015-0084, Dkt. No. 1, Ameren 2014 IRP, Chapter 5 (describing environmental controls necessary at Labadie and other facilities).

³² Tr. p. 1952, ll. 11-24.

IV. Conclusion

The ESP retrofits at issue in this case cost upwards of \$150M.³³ Given the magnitude of this expenditure, either one of Dr. Hausman's concerns alone would create a serious doubt as to the prudence of the ESP retrofits. That is, if Ameren imprudently incurred these investments, ratepayers would detrimentally suffer by paying for the Company's improvidence. To date, the Company has not provided sufficient evidence to support its ESP expenditures. Accordingly, the Commission should deny recovery of those investments unless or until Ameren presents a complete and transparent net present value analysis that accounts for a reasonable range of environmental costs and risks at Labadie Units 1 and 2.

Moreover, the lack of transparency in this case concerning the Company's justification of its expenditures is troubling. As the Company notes, the Labadie ESPs are just one example of the substantial risks and capital investments associated with running a coal-heavy generation fleet.³⁴ As Ameren is likely to return to the Commission in the near future to seek rate recovery in the millions if not billions of dollars for additional investments in its aging coal fleet,³⁵ the Commission should make clear that the deficiencies in the evidence that Ameren has presented in this case should not be repeated in future filings. Specifically, for environmental retrofits of this or greater magnitude, the Commission should require that the Company's initial rate case filing include a net present value analysis that takes into account reasonable ranges of costs and risks facing the investment for which recovery is sought. The absence of such an analysis in this proceeding has inhibited meaningful review and stakeholder participation concerning the

³³ Exhibit 28, Direct Testimony of Michael Moehn, p. 12, ll. 17-19. *See also* Tr. p. 1924, ll. 18-25.

³⁴ Ameren *Initial Post-Hearing* Brief, p. 66.

³⁵ *See, e.g.*, Exhibit 28, Direct Testimony of Michael Moehn, p. 12, ll. 5-23, p. 13, ll. 1-18 (explaining that "Ameren Missouri faces a bow wave of capital investment needs over the next 15-20 years that will be unprecedented for the Company.").

prudence of the ESP expenditures. Because Ameren has failed to meet its burden of providing evidence that demonstrates those expenditures were prudent, Sierra Club respectfully urges the Commission to deny their recovery.

Respectfully submitted,

/s/ Sunil Bector

Sunil Bector
Admitted Pro Hac Vice
Sierra Club

85 Second Street, 2nd Floor
San Francisco, CA 94105
415.977.5759 (phone)
415.977.5793 (fax)
sunil.bector@sierraclub.org

/s/ Thomas Cmar

Thomas Cmar
Admitted Pro Hac Vice
Earthjustice

5042 N. Leavitt St., Suite 1
Chicago, IL 60625
312.257.9338 (phone)
212.918.1556 (fax)
tcmar@earthjustice.org

/s/ Henry B. Robertson

Henry B. Robertson
Mo. Bar No. 29502
Great Rivers Environmental
Law Center

705 Olive Street, Suite 614
St. Louis, MO 63101
314.231.4181 (phone)
314.231.4184 (fax)
hrobertson@greatriverslaw.org

Attorneys for Sierra Club

CERTIFICATE OF SERVICE

I hereby certify that a true and correct PDF version of the foregoing was filed on EFIS and electronically mailed to all counsel of record on this 10th day of April, 2015.

/s/ Sunil Bector
Sunil Bector